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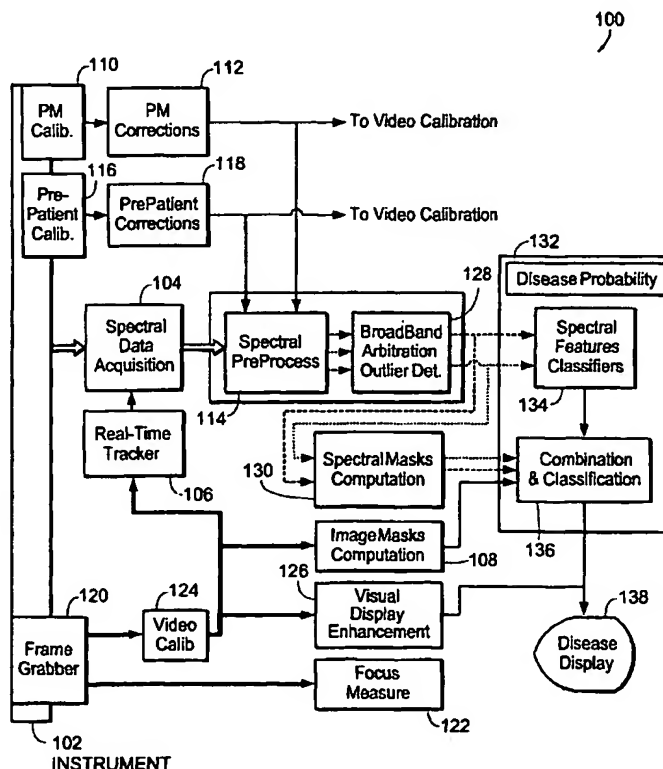
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[Continued on next page]

(54) Title: **SYSTEMS FOR IDENTIFYING, DISPLAYING, MARKING, AND TREATING SUSPECT REGIONS OF TISSUE**



(57) Abstract: The invention provides systems (102) for automatically localizing areas of disease within a tissue sample using fluorescence spectra, reflectance spectra, and video images (102) obtained from the sample. The invention further provides systems for displaying (138), marking, and treating the identified areas so that healthy surrounding tissue suffers minimal impact upon treatment and/or excision of the diseased tissue (104). The invention facilitates minimally-invasive treatment by accurately directing treatment to only those areas that are identified as diseased.

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INTERNATIONAL SEARCH REPORT

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A. CLASSIFICATION OF SUBJECT MATTER

IPC(7) : G06K 9/00, 9/62; A61B 6/00

US CL : 382/128, 133, 134, 224, 133; 600/476

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S. : 382/128, 133, 134, 224, 133; 600/476

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X — Y	US 6,466,687 B1 (UPPALURI et al) 15 October 2002 (15.10.2002), the entire document.	1-3, 6-9, 11-22, 24-31, 35-36, 39-45, 52, 56- 57 32-34
Y	US 6,427,082 B1 (NORDSTROM et al) 30 July 2002 (30.07.2002), the entire document.	4-5, 23, 37-38, 46-51, 53-54

☐ Further documents are listed in the continuation of Box C.☐ See patent family annex.

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